Table M.5.6.2.2–2.—National Ignition Facility Chemical Accident Consequences (Median Meteorology)

		ME	ieoroiogyj			
		Noninvolved Worker		Site Boundary		
ERPG-2 <sup>a</sup>	ERPG-3 <sup>a</sup>	Average Predicted		Average Predicted		ERPG-2
Concentration	Concentration	Concentration	Fraction of	Concentration	Fraction of	Distance
(ppm)	(ppm)	(ppm)	ERPG-2	(ppm)	ERPG-2	(meters)
Release of nitric	acid solution					
6	78	199	33.2	17.6	2.93	604
Release of acetor	ne					
8,500	8,500	279	0.033	279	0.033	11
Mercury release	from ignitrons					
0.25	0.5	0.0153	0.0612	0.0098	0.0392	23
Aircraft crash rel	ease of mercury					
0.25	0.5	0	0	0	0	< 10
Earthquake releas	se of lithium hydri	de <sup>b</sup>				
0.31	1.56	0	0	0	0	< 10
Earthquake releas	se of beryllium <sup>b</sup>					
0.068	0.27	0	0	0	0	< 10
Earthquake releas	se of thorium <sup>b</sup>					
5.27	26.37	0	0	0	0	< 10
Earthquake releas	se of uranium <sup>b</sup>					
0.103	1.03	0	0	0	0	< 10

Source: LLNL 2003d.

TABLE M.5.6.2.2–3.—National Ignition Facility Chemical Accident Consequences (Unfavorable Meteorology)

	ERPG-3 a Concentration (ppm)	Noninvolved Worker		Site Boundary		
ERPG-2 a Concentration (ppm)		Average Predicted Concentration (ppm)	Fraction of ERPG-2	Average Predicted Concentration (ppm)	Fraction of ERPG-2	ERPG-2 Distance (meters)
Release of nitric	acid solution					
6	78	394	65.7	31.8	5.3	1,100
Release of acetor	ne					
8,500	8,500	552	0.065	552	0.065	30
Mercury release	from ignitrons					
0.25	0.5	0.25	1.0	0.164	0.66	100
Aircraft crash rel	lease of mercury					
0.25	0.5	. 0	0	0	0	11
Earthquake relea	se of lithium hydri	de <sup>b</sup>				
0.31	1.56	0.1076	0.35	0	0	58
Earthquake relea	se of beryllium <sup>b</sup>					
0.068	0.27	0	0	0	0	44
Earthquake relea	se of thorium <sup>b</sup>					
5.27	26.37	0.00128	$2.43 \times 10^{-4}$	0	0	< 10
Earthquake relea	se of uranium <sup>b</sup>					
0.103	1.03	0.00262	0.025	0	0	16

Source: LLNL 2003d.

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 <sup>&</sup>lt;sup>a</sup> ERPG=Emergency Response Planning Guideline.
<sup>b</sup> Smaller amounts used for No Action and Reduced Action Alternatives. ppm = parts per million.

<sup>&</sup>lt;sup>a</sup> ERPG=Emergency Response Planning Guideline.

<sup>&</sup>lt;sup>b</sup> Smaller amounts used for No Action and Reduced Action Alternatives. ppm = parts per million.